1310.26 Customer Service Center Functional Standard
Issued: October 5, 2001

SUBJECT: Customer Service Center Functional Standard

APPLICATION: Executive Branch Departments and Sub-units

PURPOSE: The purpose of this standard is to provide the framework for resolving customer problems. These problems may pertain to a single operating unit (OU) or cut across multiple operating units.

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SUMMARY: The objective of this procedure is to establish a functional framework for an enterprise customer service center and for customer relationship management initiatives at the enterprise operating unit levels.

APPLICABLE FORMS: None

PROCEDURES:
General Information: Business drivers for the enterprise customer service center and for agency customer service initiatives have been identified by surveying the executive branch agencies, the *e-Michigan* agency, and through customer research initiatives. From these surveys, functions and specifications to support each business driver were also identified.

Business Drivers:
1. Provide quality customer service
2. Provide a single point of contact
3. Move from an organization focus to a customer focus
4. Improve customer access
5. Gain a better understanding of customer needs
6. Provide credible, valid, reliable, and current information
7. Integrate customer touchpoints
8. Reduce duplicate efforts across departments
9. Provide support for any type of contact

This framework of the business drivers led to identifying the requirements for customer service center functionality. That functionality was mapped to major areas identified as:

1. Channels: *input*
2. Knowledge Management: *customer contact data*
3. Decision Making and Reporting: *interaction guidance and reports*
4. Call Center: *escalation process*
5. Enterprise Application Integration: *connection to the backend and case data*
6. Customer Relationship Management: *software component that pulls the functional areas together*

The following map visually depicts the business drivers, functional areas, and functional requirements for the standard.

BUSINESS DRIVERS

- Provide Quality Customer Service
- Move From Organizational Focus to Customer Focus
- Gain a Better Understanding of Customer Needs
- Provide Credible, Valid, Reliable and Current Information
- Make Data Accessible in a Variety of Media
- Reduce Number of Calls and Improve Handling
- Increase Hours of Availability
- Disseminate Information Faster
- Improve Customer Response Via Web
- Improve Customer Response Via Phone
- Improve Access to Information
- Be Able to Go to One Place to Quickly Get Program Info to Respond to Requests
- Integrate of Customer Touchpoints
- Improve Customer Communications
- Provide Support for On-line Transactions
- Reduce Duplicate Efforts Across Departments

KNOWLEDGE MANAGEMENT
customer contact data

- Contact Tracking
- Customer Info Database
- Notification
- Profile
- Personalization
- Stewardship
- Authorship
- Security

DECISION MAKING & REPORTING
interaction guidance and reports

- Automatic Call Distribution
- Business Rules
- Customer Survey
- Customer Handling
- Transaction Auditing
- Task Management
- Performance Management

CHANNELS
input

- Telephone
- Kiosk
- Web
- Email
- Correspondence
- Fax
- Face to Face
- Wireless
- Video Conference

CUSTOMER RELATIONSHIP MANAGEMENT
software component that pulls all pieces together

- Problem Resolution
- Profiling
- Obtain Accurate Customer Info
- Robust Search Capabilities
- Knowledge Base
- Computer Telephony Integration (CTI)
- Frequently Asked Questions
- Outreach and Campaign

GENERAL
overarching functions

- Experience Management
- Quality Customer Service
- Reduced Phone Calls
- Credible, Reliable, Valid and Current Information
- First Level Problem Resolution
- Self Service Capabilities
- Staff Training

Enterprise Application Integration (EAI)
connection to backend/case data

- Front/Back End Integration
- Access To Customer Case Information

CALL CENTER
escalation to a person

- Problem Escalation
- Customer Friendly Hand-Off
- Links To External Agencies
- Security
- Multi-Channel Access/Integration
- Web Accessible Status Board
- Standard Procedures
- Contract Information

Specifications

General Overarching Requirements

Functional

- Manage the customer experience
- Provide high quality customer service
- Reduce the number of telephone calls
- Provide credible, reliable, valid and current information
- Provide first level problem resolution and self service capabilities
- Ensure that all state employees interacting with the customer are fully trained

Technical

- Modular, open, interoperable
- Scalable
- 3-tiered architecture
- Legacy integration through middleware components in compliance with middleware standard
- Security authentication and authorization
- Single log-on
- Security of data

Channels

- *General Channel Specifications*
  - Customer friendly
  - 24x7
  - Next business day response
  - Universal queuing where appropriate
  - Direct points of contact where necessary
  - One stop shopping
  - Skilled staff
  - Knowledgeable staff
  - Automate document management systems (e-mail, fax, correspondence, web)
  - Each channel have automatic links (hooks) to other channels for responses
  - Must log in each query and response
- Telephone
  - Minimum time for operator pick-up
  - Capability to jump out of queue into IVR and hold place in line
  - Capability to hold place in queue and call back
  - Announce hold time
  - Customer Profile Display
  - ADA enabled
  - Multi-lingual
  - Voice recognition search
  - Send to point of contact by key word
  - Recording for monitoring and quality
  - Emergency default numbers
- Web
  - Have hooks to e-mail for question and answer
  - Answer questions through enterprise center by next business day (otherwise based on agency business rules)
  - Robust search (see Customer Relationship Management for detailed specifications)
  - Standardized format for FAQ

- Capability to download and upload forms (e.g., product orders, permits, applications)
  - Multi-lingual
  - ADA enabled
  - Capability to link to federal and local agencies, both public and private
  - Increase easy public access to the Internet
  - High security of data
  - Improve accessibility to data warehouse
  - Call back capability
  - Real time chat capability
- Email and Facsimile
  - Routing by key word search
  - Universal email address
  - Profile customers
  - Automatic forward to knowledge source (skills based routing)
  - Minimum standards for response
  - Immediate auto-acknowledgement with timeline for response
  - Auto response capability
  - Capability to forward to other persons/agencies (i.e., external) and inform sender
  - Email notification
  - Broadcast fax subscription
- Correspondence
  - Minimum standards for response set by agency business rules
  - Link to other channels for response
  - Track responses and receipt by customer
  - Log-in and customer profile
- Wireless
  - Caller ID
  - Wireless protocol
  - Prioritization
- Kiosk
  - Fill out and submit forms on-line
  - Tie into State Web site and agency Web sites
  - Robust search
  - Consistent look and feel with e-Michigan portal
  - Security of data
- Face to Face
  - Access to other information/agencies (no wrong door); can be via different channel
  - If lines, send person to check with customer to make sure they have correct documents or information
  - Have number system and seating if long lines
  - Must be patient and civil regardless of stress level (training)
- Video Conferencing
  - Access to all geographic areas in the State of Michigan
  - Use for internal and external customers
  - Share equipment and facilities across agencies
  - Multiple uses for equipment – training, meetings, telemedicine, arraignments, desktop between staff

Customer Relationship Management

- Problem Resolution
  - Questioning techniques to help customers refine questions or lead through categories
  - Multiple channel access

  - Mechanism to define, administer, and update business rules
- Profiling
  - Personalize a profile
  - Ability to register new customers
  - Customer experience analysis by topic and resolution
  - Workflow capabilities
  - Ability to archive customers without losing knowledge from ticket
- Robust Search
  - Limit number of returns by relevancy
  - Search across agency and government branches
  - Have alternative contact information (phone, email) on search page
  - Provide for keyword search, including synonyms, like terms and standard Boolean operators
  - Common/natural language queries
  - Provide different search functionality for different theme and thread areas, such as searching by business industry or size in the business thread, searching by sport in the Travel and Tourism thread, etc.
  - Somewhat structured for consistent response
  - Capable of searching multiple knowledge bases
  - Verification of links to any referenced documents
  - Capability to search data in multiple formats
- Knowledge Base
  - System should be self learning with a built-in authoring and approval process
  - Escalation capability if system cannot solve the problem
  - Self help capabilities
  - Incorporate agency business rules
  - Provide for knowledge segmentation (e.g., segment by agency)
- Computer Telephony Integration (CTI)
  - Ability to display customer profile
  - Ability to accommodate customer data from multiple legacy systems
  - Automatic number identifies customer and allows a caller's record to be retrieved from database
  - Interface with IVR (interactive voice response) system
  - Network load balancing
  - Built in routing
- Frequently Asked Questions (FAQ)
  - Consistent format
  - Distributed administration (each agency administers its own FAQs)
  - Managed, timely review to remove out of date information and add current information
- Outreach and Campaign
  - Interface with a listserv
  - Ability to send email/facsimile based on information from profile
  - Personalization, sessions-based (customize portal – i.e. "My Michigan")
  - Reporting on campaign status and statistics

- Ensure Accuracy of Customer Information
  - Comprehensive contact log
  - Track customer channel used and nature of contact
  - Filter information for accuracy

Call Center

- Problem Escalation

- Escalation to group or individual based on severity and/or categories and issues rules
  - Do live handoff to next level
  - Escalate or route to any pre-defined extension or telephone number
- Customer friendly handoff for all channels to and from agencies
  - Trouble ticket or electronic interaction
- Link to External Agencies
  - Federal, State and Local
- Security
  - Group and individual access on specific permission basis
- Multi-Channel Access and Integration
- Web accessible status board for notifications permanent to call center
  - Server or LAN problems
  - Phone or access problems
  - State system problems
  - Agency system problems
- Standard Call Center Procedures
  - Store all standard error messages and procedures
  - Response times based on problem priority as determined by business rules
  - Store standard process procedures – questions to ask and who to call for 2^{nd} level support
- Contract Information (Service Level Agreements, Working Relationships)
- Notification of resolution for status and knowledge capture

Knowledge Management

- *General Knowledge Management Specifications*
  - Version control – update software without affecting customized fields or views
  - Every contact must be logged
  - Lookup - Customer history
  - Lookup – Open tickets
  - Create new tickets
  - Display on window ticket view indicating the number of open/assigned/closed calls or tickets
  - Mandatory call ticket fields on ticket view – Ability to customize, rename, mark as mandatory
  - Links to step-by-step procedures
  - Links to reports
- Contact Tracking
  - Create new customer and company from ticket view or input channel
  - Lookup customer and company from ticket view or input channel

- Customer Information Database
  - Customer mandatory fields on customer/company view (separate or combined views) - Ability to customize, rename, mark as mandatory
  - Company mandatory fields on customer/company view (separate or combined views) - Ability to customize, rename, mark as mandatory
- Notification
  - Customer if desired by agency (business rule)
  - When ticket is assigned to a group or analyst
- Profile
  - Ability to establish by customer, company, and demographic regions
- Customization
  - Windows view customization of existing fields

- Windows view customization of user defined fields
- Stewardship
  - Maintain data – scalable size, searchable data
  - Database maintained by *e-Michigan* (customer, ticket database, and single point of contact)
  - Pass customer information to other State of Michigan systems, including registration (i.e., register once)
  - Accept information from other State of Michigan systems on ticket resolution
- Authorship
  - Customer via input channel
  - Analyst enter data
  - Accept data response from other State of Michigan systems
    - Return notification item assigned to analyst or solution with completion date and time
    - Return to original thread
- Security
  - Profiles by groups and analyst
    - Record level security, field level security and functional security
    - Problem resolution ticket security
  - Protect data through referential integrity (can't delete a parent record if a child record exist) database system (i.e., SQL)
- Import / Export of Data
  - Conversion interface process for legacy systems
  - Consistent with State of Michigan "middleware" standards

Decision Making & Reporting

- Automatic Call Distribution
  - Web based open architecture
  - Utilize existing communications infrastructure as much as possible
  - Maximize the effectiveness of the customer interaction (language, ease of use, availability, etc.)
  - Management for the Immediate Response (one/two tier and overflow) and Controlled Response call center models:
  - Integrate with Knowledge base
  - Reporting Features:
    - Provide real-time and on-line historical reports
    - Handle reporting for any media customer chooses to use
    - On screen ad hoc reporting
    - Standard ACD reporting…
  - Provide HTML format, Microsoft Office and ASCII format exports of all data
  - Provide for call overflow handling
  - Staff scheduling feature based on call volumes
  - Provide for on-line interactive training
  - Video conferencing on-line for staff
  - Language translation assistance to staff if required.
  - Accept all incoming calls-no busy signals or disconnects in the process.
  - Recognize repeat calls from or to the same #
  - Integrate into other modules
  - Notify the caller that the call may be monitored for quality/training
  - Skills based routing
  - Caller directed calls to specific destinations (Press 1 for…)
  - Provide managers the ability to change greeting message
  - Long term data storage (13 months) with off-line archiving

- Internal auditing on all data elements
- Check for spelling / grammar internal to CRM application
- Windows 2000 compatible software, minimum desktop footprint/memory usage, self-healing.

- Business Rules
  - Create rules for customer interaction
  - Build rules to meet service level agreements
  - Capability to modify existing rules on the fly
  - Remote administration and modification of rules
  - Integrate with agency rules engine
  - Have "knowledge engineers" / agency liaisons to keep information and process knowledge current
  - Ensure that there is follow-up to all requests
  - Limit customer contact hours and distribute administrative tasks among agents
  - Staff center according to business drivers and events (e.g., hunting season, tax filing, elections)
- Customer Handling
  - Detailed customer contact log
  - Personalization to customer's specifications
  - Allow customer to choose desired level of service (self help, IVR, web, email, phone, etc.)
  - Highly trained and customer oriented agents
- Transaction Auditing
  - Capability to audit everything
  - System to record every screen change or entry
  - Generate reports on schedule or ad hoc basis
  - Audit for quality by spot checks, administrative privileges, listening on conversations, chat monitoring
- Task Management
  - View and manage outstanding work
  - Record completion of activities (manual and automatic)
  - Delegate work
  - Capability for customer agent to record activities
- Customer Survey
  - Capability to conduct customer satisfaction surveys
  - Survey analysis and reporting

Enterprise Application Integration

- *General EAI Specifications*
  - Customer Friendly Interfaces
  - Departmental Data Sharing
- Integration of front-end systems (e.g., MS Office, email applications, client/server applications) with back-end systems (typically considered legacy systems – main data processing engines)
  - *technical application integration specifications must be based on specific integration requirements*
- Access to Customer Case Information
  - Stewardship
  - Authorship

MAINTENANCE:

DIT: Acquisition Services shall not approve any acquisition or purchase request without confirmation from the Department of Information Technology, Office of Bureau of Strategic Policy that such request is in compliance with the standard.

Operating Unit(OU): Any and all projects, consulting requests, equipment and software acquisition requests, or ITB's relating to Customer Service, Customer Relationship Management, and Customer Contact Centers must have given consideration to the functional requirements of this standard and will be subject to review for compliance with this standard.

DIT: The Enterprise Standards Review Team (ESRT) will review this standard on a continuing basis and make recommendations to the State Chief Information Officer. An appropriate group of staff, representing a wide-range of State Operational Units, will review and possibly revise these standards and guidelines as often as needed.

Exceptions from this standard for reasons other than those outlined above will be made through the exception handling process described in the Exception Process Template.

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